

CLAIMS

What is claimed is:

- 5 1. A power tool comprising:
 a body housing a motor and a drive mechanism driven by the motor and
 providing a first grip surface, the body having a rearward end; and
 a hand grip connected to the rearward end of the body, the hand grip
 providing a second grip surface and being supported for movement relative to the body
10 between a first position, in which the first grip surface and the second grip surface are
 generally aligned, a second position, in which the second grip surface defines an obtuse
 angle with respect to the body axis, and a third position, in which the second grip surface
 is generally perpendicular to the first grip surface.
- 15 2. The power tool of claim 1, and further comprising a switch assembly
 operable to electrically connect the motor to a power source, at least a portion of the
 switch assembly being supported on the hand grip for movement with the hand grip
 relative to the body and relative to the motor.
- 20 3. The power tool of claim 2, and further comprising a wiring arrangement
 electrically connecting the switch assembly to the motor and accommodating movement of
 the switch assembly with the hand grip relative to the body and relative to the motor.
4. The power tool of claim 1, wherein the hand grip has a first end pivotally
25 connected to the rearward end of the body and a second end, the hand grip including a
 trigger positioned intermediate the first end and the second end.
5. The power tool of claim 1, and further comprising a locking mechanism for
 selectively locking the hand grip in each of the first position, the second position, and the
30 third position.

6. The power tool of claim 5, wherein the locking mechanism includes a first recess, a second recess and a third recess defined by the one of the body and the hand grip, and a projection defined by an other of the body and the hand grip, the projection being engageable in the first recess to lock the hand grip in the first position, in the second recess to lock the hand grip in the second position, and in the third recess to lock the hand grip in the third position.

7. The power tool of claim 5, wherein the locking mechanism is moveable between a locked condition, in which the locking mechanism prevents movement of the hand grip relative to the body, and an unlocked condition, and wherein the power tool further comprises an actuator for moving the locking mechanism between the locked condition and the unlocked condition.

8. The power tool of claim 5, wherein the locking mechanism is biased toward a locked condition, in which the locking mechanism prevents movement of the hand grip relative to the body.

9. The power tool of claim 1, and further comprising a cord connected to the hand grip and operable to electrically connect the motor to a power source.

10. The power tool of claim 1, wherein the rearward end of the body houses the motor, and wherein the hand grip is pivotably connected to the body rearwardly of the motor.

11. The power tool of claim 1, wherein the power tool is a reciprocating saw, and wherein the reciprocating saw further comprises a reciprocating spindle for supporting a tool element, the drive mechanism being operably connected to the spindle for causing reciprocation of the spindle.

12. A power tool comprising:
a body housing a motor and a drive mechanism driven by the motor, the body having a rearward end;
a hand grip connected to the rearward end of the body, the hand grip being supported for movement relative to the body;
a locking mechanism for locking the hand grip in a position relative to the body, the locking mechanism having a locked condition, in which the locking mechanism prevents movement of the hand grip relative to the body, and an unlocked position; and
an actuator supported on one of the body and the hand grip and operable to move the locking mechanism between the locked condition and the unlocked condition.
13. The power tool of claim 12, wherein the body provides a first grip surface, wherein the hand grip provides a second grip surface, and wherein the hand grip is supported for movement relative to the body between a first position, in which the first grip surface and the second grip surface are generally aligned, a second position, in which the second grip surface defines an obtuse angle with respect to the body axis, and a third position, in which the second grip surface is generally perpendicular to the first grip surface.
14. The power tool of claim 13, wherein the locking mechanism selectively locks the hand grip in each of the first position, the second position, and the third position.
15. The power tool of claim 14, wherein the locking mechanism includes a first recess, a second recess and a third recess defined by the one of the body and the hand grip, and a projection defined by an other of the body and the hand grip, the projection being engageable in the first recess to lock the hand grip in the first position, in the second recess to lock the hand grip in the second position, and in the third recess to lock the hand grip in the third position.

16. The power tool of claim 12, wherein the locking mechanism is biased toward the locked condition.

5 17. The power tool of claim 12, and further comprising a switch assembly operable to electrically connect the motor to a power source, at least a portion of the switch assembly being supported on the hand grip for movement with the hand grip relative to the body and relative to the drive mechanism.

10 18. The power tool of claim 17, and further comprising a wiring arrangement electrically connecting the switch assembly to the motor and accommodating movement of the switch assembly with the hand grip relative to the body and relative to the drive mechanism.

15 19. The power tool of claim 12, wherein the hand grip has a first end pivotally connected to the rearward end of the body and a second end, the hand grip including a trigger positioned intermediate the first end and the second end.

20 20. The power tool of claim 12, and further comprising a cord connected to the hand grip and operable to electrically connect the motor to a power source.

21. The power tool of claim 12, wherein the rearward end of the body houses the motor, and wherein the hand grip is pivotably connected to the body rearwardly of the motor.

25 22. The power tool of claim 12, wherein the power tool is a reciprocating saw, and wherein the reciprocating saw further comprises a reciprocating spindle for supporting a tool element, the drive mechanism being operably connected to the spindle for causing reciprocation of the spindle.

23. A method of operating a power tool, the power tool including a body housing a motor and a drive mechanism driven by the motor and providing a first grip surface, the body having a rearward end, and a hand grip connected to the rearward end of the body, the hand grip providing a second grip surface and being supported for movement relative to the body, said method comprising the acts of:

positioning the hand grip in a first position in which the first grip surface and the second grip surface are generally aligned;
operating the power tool in the first position;
moving the hand grip relative to the body to a second position in which the second grip surface defines an obtuse angle with respect to the body axis;
operating the power tool in the second position;
moving the hand grip relative to the body to a third position in which the second grip surface is generally perpendicular to the first grip surface; and
operating the power tool in the third position.

24. The method of claim 23, wherein the moving acts include pivoting the hand grip relative to the body.

25. The method of claim 23, and wherein the power tool further includes a locking mechanism operable to lock the hand grip in a position relative to the body, and wherein said method further comprises the act of moving the locking mechanism between a locked condition, in which the locking mechanism prevents movement of the hand grip relative to the body, and an unlocked condition.

26. The method of claim 25, wherein the power tool further includes an actuator operable to move the locking mechanism between a locked condition and an unlocked condition, and wherein said method further comprises the act of moving the actuator to move the locking mechanism between the locked condition, in which the locking mechanism prevents movement of the hand grip relative to the body, and the unlocked condition.